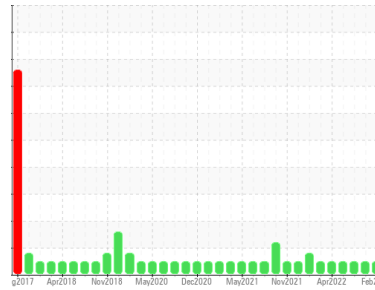




OIL ANALYSIS REPORT

Sample Rating Trend



NORMAL



Area
(P633828)

Machine Id
3758C

Component
Natural Gas Engine

Fluid
PETRO CANADA DURON GEO LD 15W40 (40 QTS)

DIAGNOSIS

Recommendation

Resample at the next service interval to monitor.

Wear

All component wear rates are normal.

Contamination

There is no indication of any contamination in the oil.

Fluid Condition

The BN result indicates that there is suitable alkalinity remaining in the oil. The condition of the oil is suitable for further service.

SAMPLE INFORMATION

method	limit/base	current	history1	history2
Sample Number	Client Info	GFL0101743	GFL0047437	GFL0063809
Sample Date	Client Info	23 Feb 2024	14 Jun 2023	14 Dec 2022
Machine Age	hrs	15100	14378	13341
Oil Age	hrs	600	600	600
Oil Changed	Client Info	Changed	Changed	Changed
Sample Status		NORMAL	NORMAL	NORMAL

CONTAMINATION

method	limit/base	current	history1	history2
Water	WC Method >0.1	NEG	NEG	NEG

WEAR METALS

method	limit/base	current	history1	history2
Iron	ppm ASTM D5185m >50	20	18	13
Chromium	ppm ASTM D5185m >4	2	3	2
Nickel	ppm ASTM D5185m >2	0	1	0
Titanium	ppm ASTM D5185m	0	<1	0
Silver	ppm ASTM D5185m >3	0	0	0
Aluminum	ppm ASTM D5185m >9	3	4	<1
Lead	ppm ASTM D5185m >30	8	14	0
Copper	ppm ASTM D5185m >35	<1	2	<1
Tin	ppm ASTM D5185m >4	0	2	0
Vanadium	ppm ASTM D5185m	0	<1	0
Cadmium	ppm ASTM D5185m	0	0	0

ADDITIVES

method	limit/base	current	history1	history2
Boron	ppm ASTM D5185m 50	8	10	14
Barium	ppm ASTM D5185m 5	8	0	0
Molybdenum	ppm ASTM D5185m 50	59	56	55
Manganese	ppm ASTM D5185m 0	0	2	<1
Magnesium	ppm ASTM D5185m 560	589	718	572
Calcium	ppm ASTM D5185m 1510	1635	1745	1727
Phosphorus	ppm ASTM D5185m 780	826	821	816
Zinc	ppm ASTM D5185m 870	992	1107	999
Sulfur	ppm ASTM D5185m 2040	2552	3118	2666

CONTAMINANTS

method	limit/base	current	history1	history2
Silicon	ppm ASTM D5185m >+100	8	8	8
Sodium	ppm ASTM D5185m	8	9	10
Potassium	ppm ASTM D5185m >20	5	3	<1

INFRA-RED

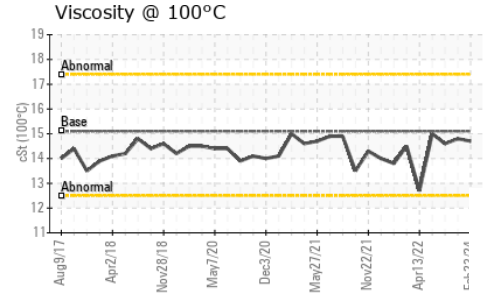
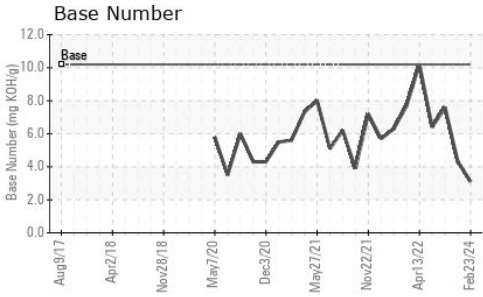
method	limit/base	current	history1	history2
Soot %	% *ASTM D7844	0	0.1	0.1
Nitration	Abs/cm *ASTM D7624 >20	12.5	11.8	12.0
Sulfation	Abs/.1mm *ASTM D7415 >30	26.9	25.8	22.5

FLUID DEGRADATION

method	limit/base	current	history1	history2
Oxidation	Abs/.1mm *ASTM D7414 >25	23.2	22.4	18.7
Base Number (BN)	mg KOH/g ASTM D2896 10.2	3.1	4.3	7.6



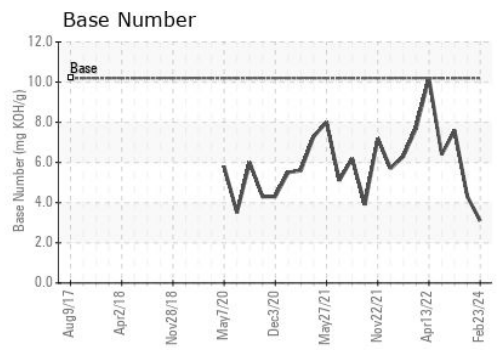
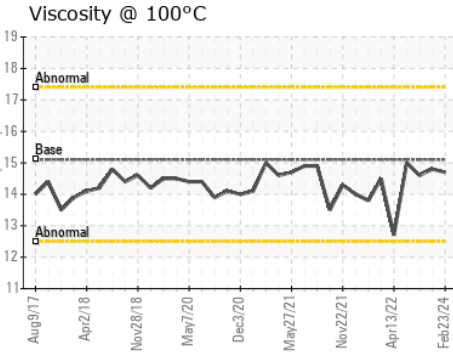
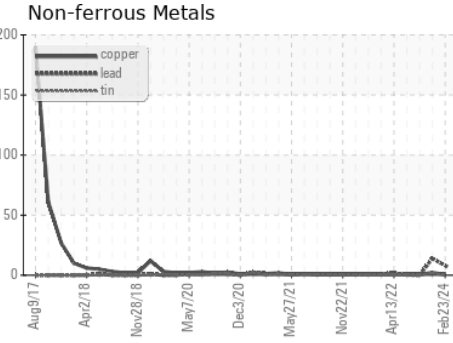
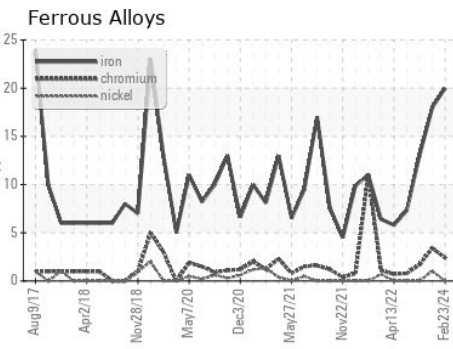
OIL ANALYSIS REPORT



VISUAL	method	limit/base	current	history1	history2
White Metal	scalar	*Visual	NONE	NONE	NONE
Yellow Metal	scalar	*Visual	NONE	NONE	NONE
Precipitate	scalar	*Visual	NONE	NONE	NONE
Silt	scalar	*Visual	NONE	NONE	NONE
Debris	scalar	*Visual	NONE	NONE	NONE
Sand/Dirt	scalar	*Visual	NONE	NONE	NONE
Appearance	scalar	*Visual	NORML	NORML	NORML
Odor	scalar	*Visual	NORML	NORML	NORML
Emulsified Water	scalar	*Visual	>0.1	NEG	NEG
Free Water	scalar	*Visual		NEG	NEG

FLUID PROPERTIES	method	limit/base	current	history1	history2	
Visc @ 100°C	cSt	ASTM D445	15.1	14.7	14.8	14.6

GRAPHS



Certificate L2367

Laboratory : WearCheck USA - 501 Madison Ave., Cary, NC 27513
Sample No. : GFL0101743
Lab Number : **06100011**
Unique Number : 10898241
Test Package : FLEET
Received : 26 Feb 2024
Tested : 27 Feb 2024
Diagnosed : 27 Feb 2024 - Wes Davis

GFL Environmental - 030 - Conway Myrtle Beach
 3010 HWY 378
 Conway, SC
 US 29527
 Contact: ARCILIO RUEZ
 aruiz@gflenv.com

To discuss this sample report, contact Customer Service at 1-800-237-1369.
 * - Denotes test methods that are outside of the ISO 17025 scope of accreditation.
 Statements of conformity to specifications are based on the simple acceptance decision rule (JCGM 106:2012)